Amdt. dated November 8, 2011

Appl. No.: 10/597,725 10/597,725

Reply to Office Action of 06/08/201106/08/2011

Amendments to the Claims:

1. (Currently Amended) A method of selecting or de-selecting one or more transponders, using a selection process comprising one or more commands-signals from an interrogator, the one or more groups of transponders being within a field of interrogation, including the step of

transmitting from the interrogator a select command signal or signals, the or each of which that includes selection or de-selection criteria, wherein transponders within the one or more groups participate in an arbitration sequence based on if a transponder meets the selection or de-selection criteria, said transponder determines the condition of a flag, said condition of the flag being used to determine one or more subsequent operations of the transponder.

- 2. (Currently Amended) A method of selecting or de-selecting one or more transponders. using a selection process comprising one or more commands signals-from an interrogator, the one or more groups of transponders being within a field of interrogation, including the step of transmitting from the interrogator a select command that signal or signals, the or each of which includes data for comparison with data stored in the memory or memories of the transponder or transponders within the one or more groups whereby, wherein the transponder or transponders within the one or more groups of transponders set or reset a select flag dependent on whether they are to be selected or de-selected and participate in an arbitration sequence based on whether the select flag is set or reset.
- 3. (Currently Amended) A method as claimed in claim 2, wherein if the data in the transponder memory corresponds to that sent by the select command-signal, the transponder is either selected or de-selected dependent on the setting of the select flag in the transponder.
- 4. (Currently Amended) A method as claimed in claim 2, wherein if the data in the transponder memory does not correspond to that sent by the select command signal, the transponder is either selected or de-selected dependent on the setting of the select flag in the transponder.

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5. (Previously Presented) A method as claimed in claim 2, wherein the select flag is connected to one or more logic gates which together define selection logic circuitry of the transponder.

- 6. (Currently Amended) A method as claimed in claim 2, wherein the <u>select flag</u> is in the form of a bistable or flip-flop, the <u>select flag</u> determining whether the transponder should respond to a Query command from the interrogator or participate in an arbitration sequence or not.
- 7. (Currently Amended) A method as claimed in claim 6, wherein if the select flag is set, the transponder will reply to athe Query command, or if not set, will not reply to athe Query command.
- 8. (Original) A method as claimed in claim 6, wherein if the select flag is not set, the transponder is adapted to participate in an arbitration sequence or reply to a Query command.
- 9. (Currently Amended) A method as claimed in claim 2, wherein the select flag serves as an exclusion mechanism, whereby <u>one or more groups or sub-groups</u> of transponders may be excluded from the arbitration sequence using this same select flag as part of the <u>a</u> determination mechanism.
- 10. (Currently Amended) A method as claimed in claim 2, wherein the selection or deselection of one or more groups of an individual transponders, or group or groups of transponders, uses a number of commands with parameters to address one or more groups of transponders a population of transponders using any content of the transponder memory as a target selection field.
 - 11. (Previously Presented) A method as claimed in claim 1 wherein the selection process

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is undertaken either as part of an arbitration process or as an independent process.

12. (Currently Amended) A method as claimed in claim 1, wherein the selection process allows one or more individual or groups of transponders to be selected, excluded or a combination of selection and exclusion using just-one command with a settable/resettable exclude flag.

- 13. (Currently Amended) A method as claimed in claim 12, wherein said one command is a select command the parameters of which allow one or more transponders within the one or more groups of transponders to be placed in a selected condition or removed from the selected condition according to a selection mask which is compared with a portion or all of the memory contents stored on the or each one or more transponders.
- 14. (Currently Amended) A method as claimed in claim 1312, wherein said one command is a connect command is used to address one or more transponders within the one or more an individual transponder or a groups of transponders in order to conduct a dialogue with it or them in the case of multiple transponders.
- 15. (Currently Amended) A method as claimed in claim 1244, wherein said one command is a Query command is used to allow the interrogator to query the one or more groups of transponders population present for the presence of any transponders which have met the selection criteria.
- 16. (Currently Amended) A method as claimed in claim 1512, wherein said one command is an acknowledge command is used to acknowledge the successful completion of an arbitration sequence of completion of a dialogue with a transponder.
- 17. (Currently Amended) A method as claimed in claim 1613, wherein said one command a singulate command is-used during an arbitration sequence to place an individual

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transponder into a state whereby a dialogue may be conducted with it.

18. (Currently Amended) A transponder comprising logic circuitry responsive to a select command signal-from an interrogator, wherein whereby if the transponder meets selection or deselection criteria in the select command signal-it is selected or deselected and wherein the transponder participates in an arbitration sequence based on whether it is selected or deselected determines the condition of a flag, said condition of the flag being used to determine one or more subsequent operations of the transponder.

- 19. (Currently Amended) A transponder as claimed in claim 18, wherein the transponder has a memory, a select flag and a comparator for comparing data in the select command signal with data in the memory, whereby the transponder sets or resets the select flag dependent on whether it is to be selected or de-selected.
- 20. (Currently Amended) A transponder as claimed in claim 19, wherein if the data in the transponder memory does not correspond to that sent by the select command-signal, the transponder is either selected or de-selected dependent on the setting of the select flag in the transponder; or if the data in the transponder memory does correspond to that sent by the select command-signal, the transponder is still selected or deselected dependent on the setting of the select flag.
- 21. (Previously Presented) A transponder as claimed in claim 19, wherein the select flag is connected to one or more logic gates which together define selection logic circuitry of the transponder.
- 22. (Currently Amended) A transponder as claimed in claim 19, wherein the select flag is in the form of a bistable or flip-flop, the select flag determining whether the transponder should respond to a Query command from the interrogator or participate in an arbitration sequence or not.

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23. (Previously Presented) A transponder as claimed in claim 19, wherein if the select

flag is set, the transponder will reply to a Query command or if not set, will not reply to a Query

command.

24. (Previously Presented) A transponder as claimed in claim 19, wherein if the select

flag is not set, the transponder is adapted to participate in an arbitration sequence or reply to a

Query command.

25. (Currently Amended) A transponder as claimed in claim 19, wherein the select flag

serves as an exclusion mechanism, whereby groups or sub-groups of transponders may be

excluded from participation in the arbitration sequence using this same select flag as part of the a

determination mechanism.

26. (Cancelled).

27. (Previously Presented) A transponder as claimed in claim 19, wherein a

settable/resettable exclude flag is provided whereby the selection process can select individual or

groups of transponders to be selected, excluded or a combination of selection and exclusion

using just one command.

28. (Currently Amended) A transponder as claimed in claim 27, said one command is a

the select command, the parameters of which allows the transponder to be placed in a selected

condition or removed from the selected condition according to a selection mask which is

compared with a portion or all of the memory contents stored on the or each-transponder.

29. (Currently Amended) A transponder as claimed in claim 2728, wherein the

transponderducer is responsive to one command wherein said one command is a connect

command which is used to address one or more transponders within the one or more an

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individual transponder or a groups of transponders in order to conduct a dialogue with it or them in the case of multiple transponders.

- 30. (Currently Amended) A transponder as claimed in claim 2927, wherein the transponderducer is responsive to one arbitration command wherein said one arbitration command a Query command which is used to allow the interrogator to query the population present one or more groups of transponders for the presence of any transponders which have met the selection criteria.
- 31. (Currently Amended) A transponder as claimed in claim 30, wherein the transducer is responsive to one command wherein said one command is an acknowledge command which is used to acknowledge the successful completion of an arbitration sequence of or completion of a dialogue with a transponder.
- 32. (Currently Amended) A transponder as claimed in claim 31, wherein the transducer transponder is responsive to one command wherein said one command is a singulate command which is used during an arbitration sequence to place an individual transponder into a state whereby a dialogue may be conducted with it.
- 33. (Currently Amended) An identification system comprising an interrogator and a plurality of transponders, the interrogator including a transmitter for transmitting selection or deselection criteria in one or more commands signals to select or de-select an individual transponder, or one or more groups of transponders, each transponder within the one or more groups of transponders including a receiver for receiving the one or more commands signal or signals and logic circuitry responsive to the commands signal or signals, whereby if the transponder meets selection or de-selection criteria in the commands signal-it is selected or deselected wherein the transponder participates in an arbitration sequence based on the selection or deselection criteriadetermines the condition of a flag, said condition of the flag being used to determine one or more subsequent operations of the transponder.

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34. (Currently Amended) An identification system as claimed in claim 33, wherein the selection or de-selection criteria is in the form of data in the one or more select commands signal or signals, the data to be compared with data in a memory or memories of the one or more groups of transponder or transponders within a field of interrogation, whereby each the transponder within the one or more groups of or transponders set or reset a select flag dependent on whether they are to be selected or de-selected.

35. (Cancelled).

- 36. (Currently Amended) An integrated circuit for use in a transponder including a receiver for receiving a select command signal from an interrogator, the integrated circuit further comprising logic circuitry responsive to a select command signal-from the interrogator whereinwhereby if the integrated circuit meets selection or de-selection criteria in the select command -signal-it is selected or deselected and the integrated circuit participates in an arbitration sequence based on the selection or deselection criteria determines the condition of a flag, said condition of the flag being used to determine one or more subsequent operations of the integrated circuit.
- 37. (Currently Amended) An integrated circuit as claimed in claim 36, comprising a memory, a select flag and a comparator for comparing data in the select command-signal with data in the memory, whereby the circuitry sets or resets the select flag dependent on whether it is to be selected or de-selected.
- 38. (Currently Amended) An integrated circuit as claimed in claim 37, wherein if the data in the memory does not correspond to that sent by the select command-signal, the integrated circuit is either selected or de-selected dependent on the setting of the select flag in the transponderintegrated circuit; or if the data in the memory does correspond to that sent by the select command-signal, the integrated circuit is still selected or deselected dependent on the

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setting of the select flag.

39-62. (Cancelled).

- 63. (New) A plurality of transponders, each of which is as claimed in claim 19, wherein the selection or de-selection of an individual transponder, or group of transponders, uses a selection process comprising a number of commands with parameters to address a population of transponders using any content of the transponder memory as a target selection field.
- 64. (New) An integrated circuit as claimed in claim 37, wherein the select flag is connected to one or more logic gates which together define selection logic circuitry of the integrated circuit.
- 65. (New) An integrated circuit as claimed in claim 37, wherein the select flag is in the form of a bistable or flip-flop, the select flag determining whether the transponder should respond to a Query command from the interrogator or participate in an arbitration sequence or not.
- 66. (New) An integrated circuit as claimed in claim 37, wherein if the select flag is set, the transponder will reply to the Query command, or if the select flag is not set, will not reply to the Query command.
- 67. (New) An integrated circuit as claimed in claim 37, wherein if the select flag is not set, the transponder is adapted to participate in an arbitration sequence or reply to the Query command.
- 68. (New) An integrated circuit as claimed in claim 37, wherein the select flag serves as an exclusion mechanism, whereby one or more groups of transponders may be excluded from an the arbitration sequence using this same select flag as part of a determination mechanism.

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69. (New) An integrated circuit as claimed in claim 37, wherein a settable/resettable exclude flag is provided whereby the selection process can select individual or groups of transponders to be selected, excluded or a combination of selection and exclusion using just one command.

- 70. (New) An integrated circuit as claimed in claim 69, wherein said one command is the select command, the parameters of which allow the transponder to be placed in a selected condition or removed from the selected condition according to a selection mask which is compared with a portion or all of the memory contents stored on the integrated circuit.
- 71. (New) An integrated circuit as claimed in claim 70, wherein the integrated circuit is responsive to one command, the one command being a connect command which is used by the interrogator to address one or more groups of transponders in order to conduct a dialogue.
- 72. (New) An integrated circuit as claimed in claim 71, wherein the integrated circuit is responsive to one command, the one command being a Query command which is used to allow the interrogator to query the one or more groups of transponders for the presence of any transponders which have met the selection criteria.
- 73. (New) An integrated circuit as claimed in claim 72, wherein the integrated circuit is responsive to one command, the one command being an acknowledge command which is used to acknowledge the successful completion of an arbitration sequence of completion of a dialogue with the a transponder.
- 74. (New) An integrated circuit as claimed in claim 73, wherein the integrated circuit is responsive to the one command, the one command being a singulate command which is used during an arbitration sequence to place an individual transponder into a state whereby a dialogue may be conducted with it.